PATENT 67176389-001100

## Amendments to the Claims:

The listing of claims will replace all prior versions, and listings, of claims in the application.

## **Listings of Claims:**

(Previously presented) An RFID interrogator, comprising:
an antenna configured to transmit and receive RF signals;

an RF transceiver configured to receive backscatter modulated RF signals, and generate transmit RF signals;

an amplifier coupled with the antenna the antenna and the RF transceiver configured to amplify the transmit RF signals;

a first energy director coupled between the RF transceiver and the amplifier, the first energy director configured to receive the RF transmit signal and direct them to the amplifier and to receive backscatter modulated RF signals and direct them to the RF transceiver; and

a second energy director coupled between the amplifier and the antenna, the second energy director configured to receive the amplified transmit signals from the amplifier and send the amplified transmit signals to the antenna, and to receive a backscatter modulated RF signal from the antenna and direct the receive backscatter modulated RF signal to the first energy director bypassing the amplifier.

PATENT 67176389-001100

- 2. (Previously presented) The RFID interrogator of claim 1, wherein the antenna transmits signals to, and receives signals from, an RFID tag.
  - 3. (Canceled).
- 4. (Previously presented) The RFID interrogator of claim 1, wherein the directors are circulators.
- (Previously presented) The RFID interrogator of claim 1, wherein the directors are directional couplers.
- 6. (Previously presented) The RFID interrogator of claim 1, wherein the amplifier is a variable gain amplifier (VGA).
- 7. (Previously presented) The RFID interrogator of claim 1, further comprising a feedback loop coupled with the output of the amplifier, the feedback loop configured to sense the output energy from the amplifier and control the amplifier gain in response to the sensed output energy.
- (Previously presented) The RFID interrogator of claim 7, wherein the feedback loop maintains the transmit signal energy at or below a certain level.
- (Previously presented) The RFID interrogator of claim 7, wherein the feedback loop maintains the transmit signal energy at or above a certain level.
- 10. (Previously presented) The RFID interrogator of claim 7, wherein the feedback loop includes an energy coupler, a rectifier, and a power leveling network.
  - 11-13. (Canceled).
- 14. (Currently amended) The RFID interrogator of claim 1, further comprising a decoder coupled with the RF transceiver, and, wherein the RF

12.3

PATENT 67176389-001100

transceiver is configured to send the received RF backscatter modulated signals to the decoder.

- 15. (Previously presented) The RFID interrogator of claim 1, further comprising a switch and a plurality of antennas, and wherein the energy director is coupled with the switch, the switch configured to direct the transmit signal to one of the plurality of antennas.
- 16. (Previously presented) The RFID interrogator of claim 15, further comprising a plurality of switches and wherein the energy director is coupled with the plurality of switches, each of the plurality of switches configured to direct the transmit signal to one or more of the plurality of antennas.
- 17. (Previously presented) The RFID interrogator of claim 1, wherein the transmit signal is transmitted to a RFID tag.
- 18. (Previously presented) The RFID scanner of claim 1, wherein the received signal contains data from the RFID tag.
  - 19-42. (Canceled).